WHAT IS CLAIMED IS:

1. An information handling system, comprising:

a power supply having a positive remote sense input;

a pull-down circuit having at least two inputs and an output, the output conductively coupled to provide a first voltage to the positive remote sense input of the power supply;

a first load position coupled to the power supply and conductively coupled to provide a second voltage to the first input of the pull-down circuit; and

a second load position coupled to the power supply and conductively coupled to provide a third voltage to the second input of the pull-down circuit;

wherein the first voltage is no greater than either the second voltage or the third voltage.

2. The information handling system of claim 1, wherein the first voltage is within 1% of the lesser of the third voltage and the second voltage.

3. The information handling system of claim 1, wherein the first load position includes a plurality of expansion connectors adapted to receive expansion cards.

4. The information handling system of claim 1, wherein the second load position includes a SCSI connector capable of coupling a plurality of SCSI devices to the information handling system.

5. The information handling system of claim 1, wherein the pull-down circuit further includes first, second and third transistors, the first input coupled to provide the second voltage to an emitter of the first transistor, the second input coupled to provide the third voltage to an emitter of the second transistor, bases and collectors of the first and second transistors conductively coupled to a base of the third transistor, coupled through a resistor to a specified voltage, and coupled through

a capacitor to ground, a collector of the third transistor coupled to the specified voltage, and an emitter of the third transistor coupled to provide the first voltage to the output.

6. The information handling system of claim 1, wherein the first load position is coupled to the power supply in a first circuit and the second load position is coupled to the power supply in a second circuit that is parallel to the first circuit.

7. The information handling system of claim 1, wherein the power supply includes a negative remote sense input and the first load position includes connectors, is conductively coupled to provide a second voltage to the first input of the pull-down circuit on a first side of the connectors, and is conductively coupled on a second side of the connectors to provide a fourth voltage to the negative remote sense input of the power supply.

8. The information handling system of claim 1, wherein the power supply has a positive terminal and the positive terminal is coupled to the first load position through cables and PCB layout.

9. The information handling system of claim 1, wherein the pull-down circuit further includes first and second operational amplifiers each having an output and positive and negative inputs, the first input coupled to provide the second voltage to the positive input of the first operational amplifier, the second input coupled to provide the third voltage to the positive input of the second operational amplifier, the output of each operational amplifier coupled to the negative input of the same operational amplifier through a diode, and the negative inputs of the operational amplifiers conductively coupled to each other, to the output of the pull-down circuit and to a specified voltage through a resistor.

10. A method for providing a feedback voltage to a power supply, comprising the steps of:

applying power from a power supply to a first load position and a second load position;

conductively coupling a first voltage from the first load position to a first input of a pull-down circuit;

conductively coupling a second voltage from the second load position to a second input of the pull-down circuit;

generating a third voltage at an output of the pull-down circuit that is no greater than either the first voltage or the second voltage;

coupling the third voltage to a remote sense input of the power supply; and

adjusting a parameter of the power applied by the power supply based on the third voltage.

11. The method of claim 10, wherein the third voltage is within 1% of the lesser of the first voltage and the second voltage.

12. The method of claim 10, the first load position includes a plurality of expansion connectors adapted to receive expansion cards.

13. The method of claim 10, wherein the second load position includes a SCSI connector capable of coupling to a plurality of SCSI devices.

14. The method of claim 10, further comprising the steps of:

coupling the first voltage from the first input of the pull-down circuit to an emitter of a first transistor;

coupling the second voltage from the second input of the pull-down circuit to an emitter of a second transistor;

coupling bases and collectors of the first and second transistors to a base of a third transistor, through a resistor to a specified voltage, and through a capacitor to ground;

coupling a collector of the third transistor to the specified voltage; and

coupling an emitter of the third transistor to provide the third voltage to the output.

15. The method of claim 10, further comprising the steps of:

coupling the first load position to the power supply in a first circuit; and

coupling the second load position to the power supply in a second circuit that is parallel to the first circuit.

16. The method of claim 10, wherein the power supply remote sense input is a positive remote sense input, the power supply includes a negative remote sense input, the first load position includes connectors, the first voltage is a voltage on a first side of the connectors, a fourth voltage is a voltage on a second side of the connectors and further comprising the steps of:

coupling the fourth voltage to the negative remote sense input of the power supply.

17. The method of claim 10, wherein the power supply has a positive terminal and the step of applying power to the first load position includes providing current to the first load position through cables and PCB layout.

18. The method of claim 10, further comprising the steps of:

coupling the first voltage from the first input of the pull-down circuit to a positive input of a first operational amplifier;

coupling the second voltage from the second input of the pull-down circuit to a positive input of a second operational amplifier;

coupling an output of each operational amplifier through a diode to a negative input of the same operational amplifier; and

coupling the negative inputs of the operational amplifiers to each other, to the output of the pull-down circuit, and to a specified voltage through a resistor.

19. The method of claim 10, wherein the adjusted parameter is voltage.

20. An information handling system, comprising:

a power supply having positive and negative terminals and a remote sense input;

a first load position coupled to a first circuit including the positive and negative terminals of the power supply, the first load position including a connector capable of connecting to and disconnecting from devices;

a second load position coupled to a second circuit including the positive and negative terminals of the power supply, at least a portion of the second circuit parallel to at least a portion of the first circuit, the second load position including a connector capable of connecting to and disconnecting from devices; and

a sense module having first and second inputs and an output, the first input coupled to the first load position on a side of the connector closest to the positive terminal of the power supply, the second input coupled to the second load position on a side of the connector closest to the positive terminal of the power supply, the output coupled to the remote sense input of the power supply, a voltage at the output equal to or less than the lesser of a voltage at the first input and a voltage at the second input, and the voltage at the output within 1% of the lesser of the input voltages.

21. The information handling system of claim 20, further comprising:

a first conductor coupled between the positive terminal and the first load position; and

a second conductor coupled between the positive terminal and the second load position;

and wherein a voltage drop of greater than 1% of the voltage between the positive and negative terminals of the power supply exists across both conductors.